

DPM 72 x 144 – 1 Phase 4 ½ DIGIT ACI/ACV

Operating Manual

The **DPM 72 x 144 – 1 Phase 4 ½ ACI/ACV** is a Digital Panel Meter (DPM) in 72 x 144 size for measurement of AC Voltage and AC Current. Five ranges for power supply are available.

Operation:

By changing short links decimal point can be adjusted as shown in sticker on page 2. The full scale value on the display can be adjusted on site with potentiometer at the rear side of the instrument from 10% to 100% of FSD (FSD = 19999). If required zero can be adjusted with the help of zero adjustment potentiometer at the rear side.

Further **DPM 72x144 – 1 Phase 4 ½ ACI/ACV** version from the series :

DPM 72 x 144 – 4 ½ ADC/VDC Instrument for DC Current and DC Voltage measurement.

Technical data

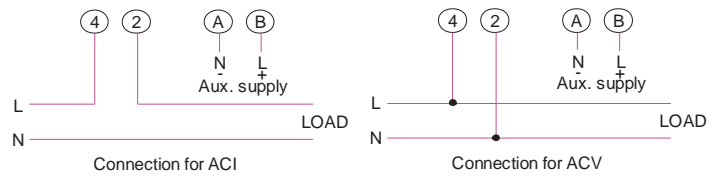
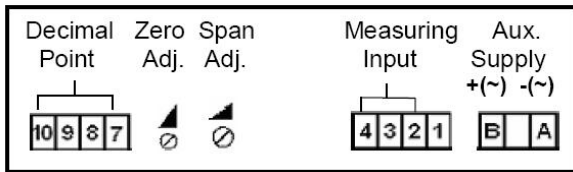
Display	Display range Decimal point position Negative display indication Digit height Overload indication	19999 selectable by short links at the Rear side. “-“ 26 mm / 7- segment digits last 4 digits blank (1).
Measuring ranges (Max overload 20% of Full scale range value)	Accuracy Voltage AC Nominal Input Voltage Burden Current AC Nominal Input Current Burden Temperature coefficient Zero point drift Range adjustment span	< 1 % of range ± 1 digit (Optional: 0.5% of range ± 1 digit)) 0...110 V or (45...65 Hz) or 400 Hz 0...240 V or (45...65 Hz) or 400 Hz 0...500 V (45...65 Hz) or 400 Hz < 0.3VA approx. 0...1 A or (45...65 Hz) or 400 Hz 0...5 A (45...65 Hz) or 400 Hz < 0.2VA approx. 300 ppm / °C Plus 200 ppm / °C. from 10% to 100% of range.
Power supply	Direct voltage DC VA Burden Alternating voltage AC VA Burden Frequency	24 V DC (+/-15%) / 110V DC (+10% / -15%) 220V DC (+10% / -15%) 5.5 W approx. (Isolated) 110 V AC(+10 % / -15%) / 230V AC (+10 % / -15%) 5.5VA approx. (Isolated) 47 - 60 Hz
Environmental conditions	Climatic class Operating temperature Storage temperature Safety class IP Protection Device safety High Voltage Test EMC immunity EMC radiated interference	Class 2 to VDE / DIN 3540. 0 ... 55 °C. -25 °C ... +65 °C. II to IEC 348 / VDE 0411. IEC EN 60 529. For Back : IP 20. Front : IP 50 (IP 54 on request) According to IEC EN 61 010. For AC Aux. : 2 kV AC, 50 Hz for 1 minute. For DC Aux. : 1 kV AC, 50 Hz for 1 minute. According to IEC / EN 61 000-4-1 up to 4. According to IEC / EN 61326 class B.
Dimensions and weights	Front bezel size Panel cut-out Overall depth Weight Approx.	72 mm x 144 mm DIN 43 700. 68 + 0.7 mm x 138 + 1.0 mm. 94 mm. approx. 500 gm.
Sundry	Connections	Plug and screw terminal blocks.

Sample sticker

DPM 72X144 – 1 Phase 4 ½ ACI		Sr. No. / /	
Range: 0... 1A[45-65Hz]		Display: 19999	
Aux. Supply	A N (-) 110 VDC B L (+) (+10 % -15 %)		
Input Current (I)	4 LO COMMON		
	2 HI 0... 1 A		
Decimal Point Adjustment	XXXXX X.XXXX XX.XXX XXX.XX XXXX.X		
Decimal Point	Zero Adj.	Span Adj.	Measuring Input
10 9 8 7	▲ ▼	▲ ▼	4 3 2 1 B A

DPM 72X144–1 Phase 4 ½ ACV		Sr. No. / /	
Range: 0... 110V[45-65Hz]		Display: 19999	
Aux. Supply	A N (-) 110 VDC B L (+) (+10 % -15 %)		
Input Voltage (V)	4 LO COMMON		
	2 HI 0... 110 V		
Decimal Point Adjustment	XXXXX X.XXXX XX.XXX XXX.XX XXXX.X		
Decimal Point	Zero Adj.	Span Adj.	Measuring Input
10 9 8 7	▲ ▼	▲ ▼	4 3 2 1 B A

Connection Diagram

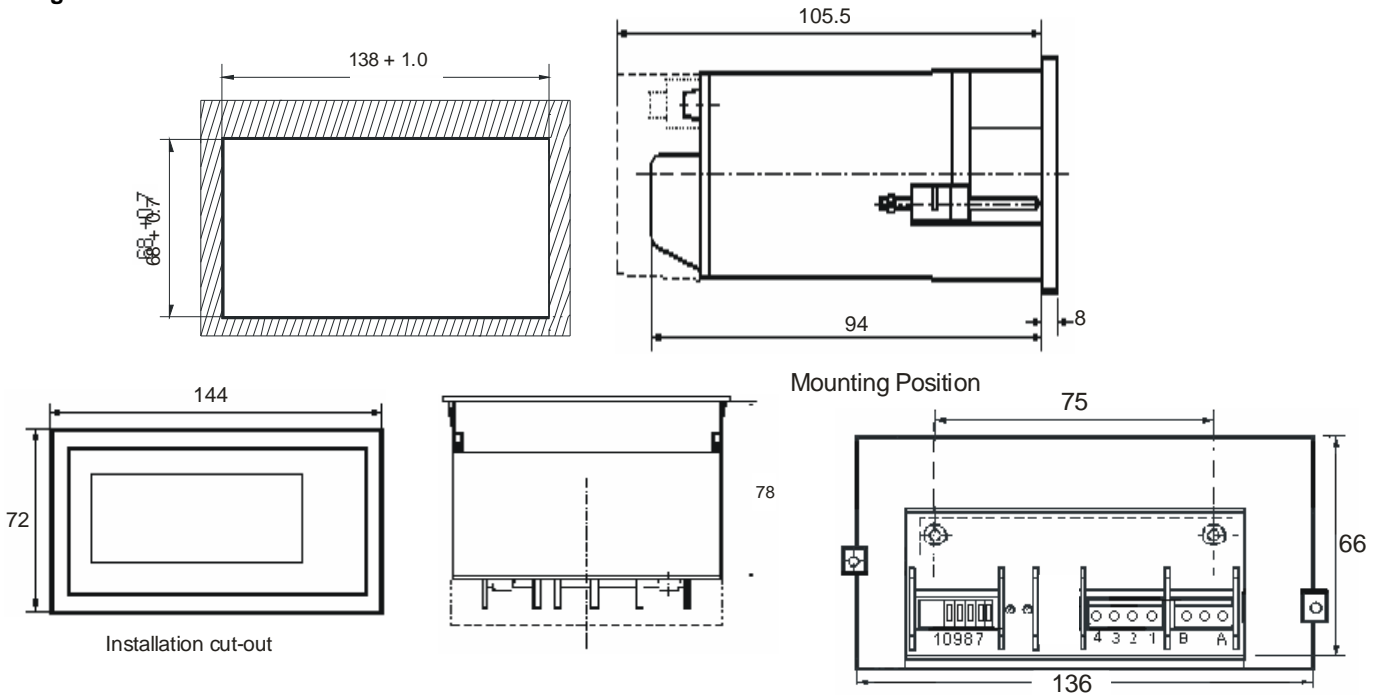


Measuring input

Aux. Supply :
Voltage AC :
Current AC :
Display adjust (with external calibrator)
Decimal point programming

Terminals A (-/N) and B (+/L)
Terminals 4 and 2
Terminals 4 and 2
With zero and span pots.
With short links at rear side.

Design and Installation



Caution : Do not change the short links on Display (for decimal point adjustment) when the input is applied to the DPM.

Subject to change without notice!
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